

UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 6,977,151 B2
DATED : December 20, 2005
INVENTOR(S) : Kayyem et al.

Page 1 of 3

It is certified that error appears in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

Column 67, line 29 thru Column 68, line 64,
Replace all claims with the following:

1. A composition comprising:
 - a) an electrode comprising a passivation monolayer comprising nucleic acid probes attached to said electrode with a spacer; and
 - b) a hybridization indicator.
2. A composition according to claim 1 wherein said hybridization indicator is an intercalator.
3. A composition according to claim 1 wherein said hybridization indicator is methylene blue.
4. A composition according to claim 1 further comprising a target nucleic acid hybridized to said probe to form a hybridization complex, wherein said hybridization indicator is associated with said hybridization complex.
5. A composition according to claim 1 further comprising a co-reductant.
6. A composition according to claim 1 wherein said nucleic acid probe is a single stranded nucleic acid.
7. A composition according to claim 1 wherein said nucleic acid probe comprises a double stranded portion.
8. A composition according to claim 1 further comprising a soluble electron source.
9. A composition according to claim 8 where said soluble electron source comprises ferricyanide.
10. A composition according to claim 1 wherein said spacer is a conductive oligomer.
11. A composition according to claim 1 wherein said spacer is an insulator.
12. A composition according to claim 11 wherein said insulator comprises $(CH_2)_6$.
13. A composition according to claim 1 wherein said passivation agent monolayer is an insulator.

UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 6,977,151 B2
DATED : December 20, 2005
INVENTOR(S) : Kayyem et al.

Page 2 of 3

It is certified that error appears in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

Column 67, line 9 thru Column 68, line 64 (cont'd).

14. A composition comprising:
 - a) a hybridization indicator; and
 - b) an array of electrodes, each comprising
 - i) a passivation agent;
 - ii) a nucleic acid probe attached to said electrode with a spacer.
15. A composition according to claim 14 wherein said hybridization indicator is an intercalator.
16. A composition according to claim 14 wherein said hybridization indicator is methylene blue.
17. A composition according to claim 14 further comprising a target nucleic acid hybridized to said probe to form a hybridization complex, wherein said hybridization indicator is associated with said hybridization complex.
18. A composition according to claim 14 further comprising a co-reductant.
19. A composition according to claim 14 wherein said nucleic acid probe is a single stranded nucleic acid.
20. A composition according to claim 14 wherein said nucleic acid probe comprises a double stranded portion.
21. A composition according to claim 14 further comprising a soluble electron source.
22. A composition according to claim 21 where said soluble electron source comprises ferricyanide.
23. A composition according to claim 14 wherein said spacer is a conductive oligomer.
24. A composition according to claim 14 wherein said spacer is an insulator.
25. A composition according to claim 24 wherein said insulator comprises (CH₂)₆.
26. A composition according to claim 14 wherein said passivation agent monolayer is an insulator.

UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 6,977,151 B2
DATED : December 20, 2005
INVENTOR(S) : Kayyem et al.

Page 3 of 3

It is certified that error appears in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

Column 67, line 9 thru Column 68, line 64 (cont'd).

27. A composition comprising:
- a) an array of electrodes, each comprising a passivation agent monolayer comprising nucleic acid probes attached to said electrode with a spacer, wherein said spacer comprises an insulator; and
 - b) a hybridization indicator.

Signed and Sealed this

Twenty-third Day of May, 2006

A handwritten signature in black ink, appearing to read "Jon W. Dudas". The signature is stylized with a large, looped initial "J" and a cursive "Dudas".

JON W. DUDAS
Director of the United States Patent and Trademark Office